least a part of said scaffold and being sealed to it such that said scaffold and said membrane form a single piece of matter.

37. (Previously Presented) Biocompatible implant according to claim 36, wherein said implant is also biodegradable.

38. (Previously Presented) Biocompatible implant according to claim 36, wherein said scaffold is comprised of a synthetic, biocompatible and biodegradable material.

39. (Previously Presented) Biocompatible implant according to claim 38, wherein said scaffold is comprised of a biopolymer, bioglass, bioceramic, calcium sulfate, or calcium phosphate.

40. (Previously Presented) Biocompatible implant according to claim 38, wherein said scaffold is comprised of monocalcium phosphate monohydrate, monocalcium phosphate anhydrous, dicalcium phosphate dihydrate, dicalcium phosphate anhydrous, tetracalcium phophate, calcium orthophosphate phosphate, calcium pyrophosphate, a-tricalcium phosphate,13-tricalcium phosphate, or hydroxyapatite.

41. (Previously Presented) Biocompatible implant according to claim 38, wherein said scaffold is comprised of poly(α-hydroxyesters), poly(ortho esters), poly(ether esters), polyanhydrides, poly(phosphazenes), poly(propylene fumarates), poly(ester amides), poly(ethylene fumarates), poly(amino acids), polysaccharides, polypeptides, poly(hydroxy butyrates), poly(hydroxy valerates), polyurethanes, poly(malic acid), polylactides, polyglycolides, polycaprolactones, poly(glycolide-co-trimethylene carbonates), polydioxanones, or co-polymers, terpolymers thereof or blends of those polymers, or a combination of biocompatible and biodegradable materials.

42. (Previously Presented) Biocompatible implant according to claim 36, wherein said scaffold is comprised of fused, biocompatible, biodegradable granules selected from the group consisting of solid granules, porous granules, hollow granules, hollow

granules with at least one opening in the granule, or a mixture thereof; said granules having an equivalent-diameter in a range between about 100 μm to about 2000 μm, a major portion of said granules being coated with at least one biocompatible and biodegradable layer of a polymer selected from the group consisting of poly(α-hydroxyesters), poly(ortho esters), poly(ether esters), polyanhydrides, poly(phosphazenes), poly(propylene fumarates), poly(ester amides), poly(ethylene fumarates), poly(amino acids), polysaccharides, polypeptides, poly(hydroxy butyrates), poly(hydroxy valerates), polyurethanes, poly(malic acid), polylactides, polyglycolides, polycaprolactones, poly(glycolide-co-trimethylene carbonates), polydioxanones, or copolymers, terpolymers thereof, or blends of those polymers; and said polymer coating having a thickness in a range between 1 μm to 300 μm.

43. (Previously Presented) Biocompatible implant according to claim 42, wherein said granules having an equivalent-diameter in a range between about 500 μm to about 1000 μm.

44. (Previously Presented) Biocompatible implant according to claim 42, wherein said polymer coating has a thickness in a range between 5 μm to 30 μm.

45. (Previously Presented) Biocompatible implant according to claim 42, wherein said granules have a spherical shape.

46. (Previously Presented) Biocompatible implant according to claim 36, wherein said scaffold has an open porous configuration with interconnected pores having a size in a range between about 10 μm to about 2000 μm.

47. (Previously Presented) Biocompatible implant according to claim 46, wherein said interconnected pores have a size in a range between about 100 μm to about 500 μm.

48. (Previously Presented) Biocompatible implant according to claim 36, wherein said membrane is made of synthetic, biocompatible and biodegradable polymer selected from the group consisting of poly(α-hydroxyesters), poly(ortho esters), poly(ether esters), polyanhydrides, poly(phosphazenes), poly(propylene fumarates), poly(ester amides), poly(ethylene fumarates), poly(amino acids), polysaccharides, polypeptides, poly(hydroxy butyrates), poly(hydroxy valerates), polyurethanes, poly(malic acid), polylactides, polyglycolides, polycaprolactones, poly(glycolide-co-trimethylene carbonates), polydioxanones, or copolymers, terpolymers thereof, or blends of those polymers.

49. (Previously Presented) Biocompatible implant according to claim 36, wherein said biodegradable membrane is a polymer film, a polymer textile, a polymer fleece, a layer of fused polymer particles or a combination thereof, thus forming at least one zone of impermeability to soft tissue and/ or epithelial cells in-growth, and having a thickness in a range between about 10 µm to about 3000 µm.

50. (Previously Presented) Biocompatible implant according to claim 49, wherein said at least one zone of impermeability to soft tissue and/ or epithelial cells in-growth has a thickness in a range between about 50 µm to about 1000 µm.

51. (Previously Presented) Biocompatible implant according to claim 36, wherein said biodegradable membrane is made of fused polymer particles.

52. (Previously Presented) Biocompatible implant according to claim 51, wherein said fused polymer particles comprise microspheres, pellets or granules, having a size smaller than about 500 µm.

53. (Previously Presented) Biocompatible implant according to claim 36, wherein said membrane has a configuration such as to allow a transport of fluids and/or molecules through the membrane, but forming a barrier against soft tissue and/or

epithelial cells in-growth into the implant.

54. (Previously Presented) Biocompatible implant according to claim 36, wherein at least a portion of the said membrane has a porous configuration, said porosity being formed by pores having sizes in the range between about 1 μm to 500 μm.

55. (Previously Presented) Biocompatible implant according to claim 54, wherein said pores have sizes in a range between about 5 μm to 50 μm.

56. (Previously Presented) Biocompatible implant according to claim 36, wherein said membrane comprises at least two layers, one of said layers having a barrier function against soft tissue and/or epithelial cells in-growth in the scaffold, and a second layer, which is direct in contact with the surrounding living organism, allowing the stabilization and anchorage of soft tissue which tends to close the wound.

57. (Previously Presented) Biocompatible implant according to claim 36, wherein said membrane comprises at least one non-porous layer.

58. (Previously Presented) Biocompatible implant according to claim 36, said scaffold and/or said membrane including void spaces that are at least partially filled with at least on of air or gas, polymer, liquid, gel, or solid particles.

59. (Previously Presented) Biocompatible implant according to claim 36, further comprising at least one biologically active substance which is integrated in said scaffold and/or in said granules and/or in a coating applied to the granules or implant and/or in said membrane and/or which is encapsulated in microspheres which are loaded into said scaffold and/or into said membrane and/or within macropores between said granules.

60. (Previously Presented) Biocompatible implant according to claim 36, further

comprising at least one additive that is integrated into said scaffold and/or into said membrane.

61. (Previously Presented) Biocompatible implant according to claim 60, wherein said at least one additive comprises a plasticizer.

62. (Previously Presented) Biocompatible implant according to claim 36, wherein an exposed surface of said biocompatible implant allows cell growth into the scaffold.

63. (Previously Presented) Biocompatible implant according to claim 36, wherein said biocompatible implant is seeded with cells.

64. (Previously Presented) Method for the preparation of a biocompatible implant for the treatment of defects in a living organism such as bone defects or tooth extraction wounds, said method comprising fusing or joining together an open porous scaffold and at least one membrane that is comprised of a polymer film, a polymer fleece, a layer of fused polymer particles or a combination thereof, thus, creating at the surface of the said implant at least one zone of impermeability against soft tissue and/or epithelial cells in-growth.

65. (Previously Presented) Method according to claim 64, wherein said implant is also biodegradable.

66. (Previously Presented) Method according to claim 64, wherein said open porous scaffold and said membrane are fused together by subjecting them for a time span of at least about 3 seconds to a pressurized CO_2 atmosphere, said CO_2 atmosphere having a pressure of about 20 bar to about 200 bar, at a temperature of about 10°C to about 100°C.

67. (Previously Presented) Method according to claim 64, wherein said open porous scaffold and said membrane are fused together by subjecting them for a time

span of at least about 10 seconds to a heat treatment at elevated temperatures of about 50°C to about 220°C.

68. (Previously Presented) Method according to claim 64, wherein after fusing together said scaffold and said membrane, said membrane is subjected to a final heat treatment at a temperature of about 100°C to about 220°C for a time span of about 5 s to about 120 s.

69. (Previously Presented) Method according to claim 64, wherein said open porous scaffold is comprised of a synthetic, biocompatible and biodegradable materials comprised of biopolymers, bioglasses, bioceramics, calcium sulfate, calcium phosphate, monocalcium phosphate monohydrate, monocalcium phosphate anhydrous, dicalcium phosphate dihydrate, dicalcium phosphate anhydrous, tetracalcium phosphate, calcium orthophosphate phosphate, calcium pyrophosphate, a-tricalcium phosphate, 13-tricalcium phosphate, apatite, hydroxyapatite, polymers, poly(α-hydroxyesters), poly(ortho esters), poly(ether esters), polyanhydrides, poly(phosphazenes), poly(propylene fumarates), poly(ester amides), poly(ethylene fumarates), poly(amino acids), polysaccharides, polypeptides, poly(hydroxy butyrates), poly(hydroxy valerates), polyurethanes, poly(malic acid), polylactides, polyglycolides, polycaprolactones, poly(glycolide-co-trimethylene carbonates), polydioxanones, or copolymers, terpolymers thereof or blends of those polymers, or a combination of biocompatible and biodegradable materials; said open porous scaffold having an open porous configuration with interconnected pores having a size of about 10 IM1 to about 2000 vim; and said membrane being made of a synthetic, biocompatible and biodegradable polymer selected from the group consisting of poly(α -hydroxyesters), poly(ortho esters), poly(ether esters), polyanhydrides, poly(phosphazenes), poly(propylene fumarates), poly(ester amides), poly(ethylene fumarate), poly(amino acids), polysaccharides, polypeptides, poly(hydroxy butyrates), poly(hydroxy valerates), polyurethanes, poly(malic acid), polylactides, polyglycolides, polycaprolactones, poly(glycolide-cotrimethylene

carbonates), polydioxanones, or copolymers, terpolymers thereof or blends of those polymers; said membrane being preferably in the form of a polymer film, a polymer textile, a polymer fleece, a layer of fused polymer particles or a combination thereof; and said membrane forming at least one zone of impermeability against soft tissue and/or epithelial cells in-growth into said implant.

70. (Previously Presented) Method according to claim 64, wherein said scaffold is comprised of fused biocompatible and biodegradable granules which are selected from the group consisting of solid granules, porous granules, hollow granules, hollow granules with at least one opening in the granule, or a mixture thereof; said granules having an equivalent-diameter of about 100 μm to about 2000 μm; and a major portion of said granules being coated with at least one biocompatible and biodegradable polymer layer having a thickness of about 1 μm to about 300 μm.

71. (Previously Presented) Biocompatible implant for the treatment of defects in a living organism such as bone defects or tooth extraction wounds, comprising at least one zone of impermeability to soft tissue and/or epithelial cells in-growth, wherein said implant is made of a composite matrix and a membrane covering at least a part of said composite matrix and being sealed to it such that said composite matrix and said membrane form a single piece of matter, said composite matrix comprising a plurality of inorganic or synthetic granules bonded or held together by a synthetic polymer matrix.

72. (Previously Presented) Biocompatible implant according to claim 71, wherein said implant is also biodegradable.

73. (Previously Presented) Biocompatible implant according to claim 71, said inorganic or synthetic granules comprising at least one of biopolymers, bioglasses, bioceramics, more preferably calcium sulfate, calcium phosphate such as, for example, monocalcium phosphate monohydrate, monocalcium phosphate anhydrous, dicalcium phosphate dihydrate, dicalcium phosphate anhydrous, tetracalcium phophate, calcium orthophosphate phosphate, calcium pyrophosphate,

a-tricalcium phosphate,13-tricalcium phosphate, apatite such as hydroxyapatite, or polymers such as, for example, poly(α-hydroxyesters), poly(ortho esters), poly(ether esters), polyanhydrides, poly(phosphazenes), poly(propylene fumarates), poly(ester amides), poly(ethylene fumarates), poly(amino acids), polysaccharides, polypeptides, poly(hydroxy butyrates), poly(hydroxy valerates), polyurethanes, poly(malic acid), polylactides, polyglycolides, polycaprolactones, poly(glycolide-co-trimethylene carbonates), polydioxanones, or co-polymers, terpolymers thereof or blends of those polymers, or a combination of biocompatible and biodegradable materials.

74. (Previously Presented) Biocompatible implant according to claim 71, said inorganic or synthetic granules selected from the group consisting of solid granules, porous granules, hollow granules, hollow granules with at least one opening in the granule, or a mixture thereof; said granules having an equivalent-diameter in a range between about 100 μm to about 2000 μm.

75. (Previously Presented) Biocompatible implant according to claim 71, said synthetic polymer matrix comprising at least one of poly(α-hydroxyesters), poly(ortho esters), poly(ether esters), polyanhydrides, poly(phosphazenes), poly(propylene fumarates), poly(ester amides), poly(ethylene fumarates), poly(amino acids), polysaccharides, polypeptides, poly(hydroxy butyrates), poly(hydroxy valerates), polyurethanes, poly(malic acid), polylactides, polyglycolides, polycaprolactones, poly(glycolide-co-trimethylene carbonates), polydioxanones, or copolymers, terpolymers thereof, or blends of those polymers.

76. (Previously Presented) Biocompatible implant according to claim 71, said composite matrix having an open porous configuration with interconnected pores having a size in a range between about 10 gm to about 2000 μm.

77. (Previously Presented) Biocompatible implant according to claim 71, said

composite matrix including void spaces between adjacent granules that are at least partially filled with at least one of air or gas, polymer, liquid, gel, or solid particles.

78. (Previously Presented) Biocompatible implant according to claim 71, said composite matrix including void spaces between adjacent granules that are filled with at least with a biologically active substance.

79. (Previously Presented) Biocompatible implant according to claim 71, wherein said biodegradable membrane is a polymer film, a polymer textile, a polymer fleece, a layer of fused polymer particles or a combination thereof, thus forming at least one zone of impermeability to soft tissue and/ or epithelial cells in-growth, and having a thickness of about 10 μm to about 3000 μm.

80. (Previously Presented) Method for the preparation of a biocompatible implant for the treatment of defects in a living organism such as bone defects or tooth extraction wounds, the method comprising fusing or joining together a composite matrix comprising a plurality of inorganic or synthetic granules and a synthetic polymer matrix and at least one membrane that is preferably made of a polymer film, a polymer fleece, a layer of fused polymer particles or a combination thereof, thus, creating at the surface of the said implant at least one zone of impermeability against soft tissue and/or epithelial cells in-growth.

81. (Previously Presented) Method according to claim 80, wherein said implant is also biodegradable.

Claims 36-81 are pending following a Preliminary Amendment filed June 21, 2005, receipt of which has been confirmed in the PAIR system. By the Preliminary Amendment, original claims 1-35 were cancelled.

On page 2 of the Office Action dated August 1, 2008, claims 4-35 are objected to as being of improper multiple dependent form. This Office Action should be withdrawn, as it only addresses the claims which were previously cancelled. Applicants' undersigned representative contacted Examiner Gherbi on October 24, 2008, and on December 31, 2008 and requested withdrawal of the Office Action in favor of a new Office Action addressing claims 36-81. However, Applicants have not received a new Office Action, or any response from the Patent Office in response to this request. The present response is therefore being submitted to preclude possible abandonment of the application, and request issuance of a new Office Action.

It is requested that the August 1, 2008 Office Action be withdrawn, and a new non-final Office Action be prepared in its place. All of pending claims 36-81 are considered allowable over U.S. Patent No. 6,054,142 (Li et al) cited in a moot rejection of canceled claims 1-3 on page 2 of the August 1, 2008 Office Action.

Allowance of the present application is respectfully requested.

Respectfully submitted,

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